

that are hybridized to the ESTs in the array produce a distinct first fluorescence emission color and the fluorescence-labeled nucleic acids obtained from the one or more second filamentous fungal cells that are hybridized to the ESTs in the array produce a distinct second fluorescence emission color, and (ii) the fluorescence-labeled nucleic acids obtained from both the first and the one or more second filamentous fungal cells that are hybridized to the ESTs in the array produce a distinct combined fluorescence emission color.

91. The method of claim 90, wherein the *Aspergillus oryzae* ESTs are SEQ ID NOs. 4377-7401.

92. The method of claim 90, wherein the *Aspergillus oryzae* ESTs are nucleic acid sequences having at least 90% homology to SEQ ID NOs. 4377-7401.

93. The method of claim 92, wherein the *Aspergillus oryzae* ESTs are nucleic acid sequences having at least 95% homology to SEQ ID NOs. 4377-7401.

94. The method of claim 93, wherein the *Aspergillus oryzae* ESTs are nucleic acid sequences having at least 99% homology to SEQ ID NOs. 4377-7401.

95. The method of claim 94, wherein the *Aspergillus oryzae* ESTs are nucleic acid sequences having at least 99.9% homology to SEQ ID NOs. 4377-7401.

96. The method of claim 90, wherein one or more of the filamentous fungal cells are selected from the group consisting of an *Acremonium*, *Aspergillus*, *Fusarium*, *Humicola*, *Mucor*, *Myceliophthora*, *Neurospora*, *Penicillium*, *Thielavia*, *Tolypocladium*, and *Trichoderma* cell.

97. The method of claim 90, wherein the two or more filamentous fungal cells are the same cell.

98. The method of claim 90, wherein the two or more filamentous fungal cells are *Fusarium venenatum* cells.

99. The method of claim 90, wherein the two or more filamentous fungal cells are *Aspergillus niger* cells.

100. The method of claim 90, wherein the two or more filamentous fungal cells are *Aspergillus oryzae* cells.

101. The method of claim 90, wherein the two or more filamentous fungal cells are different cells.